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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/729,418	12/05/2003	Thomas L. Wilson	PCI-004US	8373
29150	7590	12/15/2005	EXAMINER	
LEE & HAYES, PLLC 421 W. RIVERSIDE AVE, STE 500 SPOKANE, WA 99201			PHAM, THOMAS K	
			ART UNIT	PAPER NUMBER
			2121	
DATE MAILED: 12/15/2005				

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/729,418

Applicant(s)

WILSON ET AL.

Examiner

Thomas K. Pham

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 05 December 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-4 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 05 December 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                        | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)               | Paper No(s)/Mail Date. _____  |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                                    |

**First Action on the Merits**

1. Claims 1-4 of U.S. Application 10/729,418 filed on 12/05/2003 are presented for examination.

**Quotations of U.S. Code Title 35**

2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

***Double Patenting***

6. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

<b>Application No. 10/117,723</b>	<b>Instant Application 10/729,418</b>
<p>1. A system for adjustment of power consumption within a power grid comprising:</p> <ul style="list-style-type: none"> <li>- a group controller;</li> <li>- a plurality of sensors distributed within the power grid, the sensors being configured to assess conditions including power consumption and delivered voltage level and being configured to transmit data representative of the assessed conditions to the group controller; and</li> <li>- a plurality of devices each configured to provide power control and each including a respective local controller associated with a respective one of the plurality of devices and configured to collect data from one or more sensors of the plurality of sensors that are associated with the respective one of the devices, each of the plurality of devices being configured to adjust an associated output electrical parameter in response to commands from either the group or local controller, individual ones of the plurality of devices being distributed to respective locations within the power grid, each of the plurality devices being configured to increase or decrease the associated output</li> </ul>	<p>1. A system for adjustment of power consumption within a power grid comprising:</p> <ul style="list-style-type: none"> <li>- a group controller;</li> <li>- a plurality of sensors distributed within the power grid, the sensors being configured to assess conditions including power consumption and delivered voltage level and being configured to transmit data representative of the assessed conditions to the group controller; and</li> <li>- a plurality of devices each configured to provide power control and each including a respective local controller associated with a respective one of the plurality of devices and configured to collect <u>and filter</u> data from one or more sensors of the plurality of sensors that are associated with the respective one of the devices, each of the plurality of devices being configured to adjust an associated output electrical parameter in response to commands from either the group or local controller, individual ones of the plurality of devices being distributed to respective locations within the power grid, each of the plurality devices being configured to increase or</li> </ul>

electrical parameter when either the group controller or the associated local controller determines that such will reduce system power consumption.	decrease the associated output electrical parameter when either the group controller or the associated local controller determines that such will reduce system power consumption.
<p>10. A power adjustment apparatus comprising:</p> <ul style="list-style-type: none"> <li>- a local controller;</li> <li>- one or more sensors distributed within a power grid, the sensors being configured to assess conditions including power consumption and delivered voltage level and being configured to transmit data representative of the assessed conditions to the local controller;</li> <li>- a device associated with the one or more sensors and configured to adjust an output power level in response to commands from the local controller, the device being configured to be deployed at an associated location within the power grid, the device being configured to increase an associated output electrical parameter when the local controller determines that such will reduce power consumption.</li> </ul>	<p>2. A power adjustment apparatus comprising:</p> <ul style="list-style-type: none"> <li>- a local controller;</li> <li>- one or more sensors distributed within a power grid, the sensors being configured to assess conditions including power consumption and delivered voltage level and being configured to transmit data representative of the assessed conditions to the local controller;</li> <li>- <u>a data processor configured to filter signals from the one or more sensors and to provide filtered signals to the local controller;</u> and</li> <li>- a device associated with the data processor and configured to adjust an output power level in response to commands from the local controller, the device being configured to be deployed at an associated location within the power grid, the device being configured to increase an associated output electrical parameter when the local controller determines that such will reduce power consumption.</li> </ul>

7. Claim 1 is provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claim 1 of copending Application No. 10/117,723 in view of U.S. Patent No. 6,741,919 to Schuster et al (hereinafter Schuster).

8. The underlined portion (see above table) of the instant application indicates the additional limitations to that of the copending Application No. 10/117,723. The Schuster reference discloses the collected sensor data is filtered to provide process operating conditions (see col. 3 lines 7-22). It would have been obvious to filter the collected sensor data as taught by Schuster

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for all the reasons disclosed by Schuster such as in col. 1 lines 56-60, “determining a sensor output noise component, and comparing the output noise component to a historical sensor output noise signature based on at least one of the range of span of the sensor and the engine operating conditions”

9. Claim 2 is provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claim 10 of copending Application No. 10/117,723 in view of U.S. Patent No. 6,741,919 to Schuster et al (hereinafter Schuster).

10. The underlined portion (see above table) of the instant application indicates the additional limitations to that of the copending Application No. 10/117,723. The Schuster reference discloses an engine control unit (ECU) collects sensor data from the sensor(s) for filtering to provide process operating conditions (see col. 3 lines 7-22). It would have been obvious to filter the collected sensor data as taught by Schuster for all the reasons disclosed by Schuster such as in col. 1 lines 56-60, “determining a sensor output noise component, and comparing the output noise component to a historical sensor output noise signature based on at least one of the range of span of the sensor and the engine operating conditions”

This is a provisional obviousness-type double patenting rejection.

### **Claim Rejections - 35 USC § 103**

11. Claims 3-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2001/0034569 (“Yamamoto”) in view of U.S. Patent No. 6,741,919 (“Schuster”).

**Regarding claims 3 and 4**

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Yamamoto teaches a power control apparatus for controlling power supply from a power generation apparatus to a plurality of electric products. As the result, the limitations of claims 3 and 4 are disclosed. Each of the plurality of products is structured to be capable of outputting a first power request signal for requesting a desired amount of power. The power generation apparatus increases or decreases the amount of power generation so as to match the amount of power generation with a target amount of power generation based on the power consumption of the electric products (see page 1 paragraph 9 and page 9 paragraph 134).

Yamamoto does not teach filtering the data from the sensors to provide conditioned data;

However, Schuster teaches an engine control unit (ECU) collects sensor data from the sensor(s) for filtering to provide process operating conditions (see col. 3 lines 7-22) for the purpose of for detecting and impending failure of a sensor (see col. 1 lines 51-60).

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the filter for filtering collected sensor data of Schuster with the power control apparatus of Yamamoto because it would provide or detecting and impending failure of a sensor.

It should be noted that the description recited in the preamble of claim 3 has not given patentable weight because a preamble is generally not accorded any patentable weight where it merely recites the purpose of a process or the intended use of a structure, and where the body of the claim does not depend on the preamble for completeness but, instead, the process steps or structural limitations are able to stand alone. See *In re Hirao*, 535 F.2d 67, 190 USPQ 15 (CCPA 1976) and *Kropa v. Robie*, 187 F.2d 150, 152, 88 USPQ 478, 481 (CCPA 1951).

*Conclusion*

Any inquiry concerning this communication or earlier communications from the examiner should be directed to examiner *Thomas Pham*; whose telephone number is (571) 272-3689, Monday - Thursday from 6:30 AM - 5:00 PM EST or contact Supervisor *Mr. Anthony Knight* at (571) 272-3687.

Any response to this office action should be mailed to: **Commissioner for Patents, P.O. Box 1450, Alexandria VA 22313-1450**. Responses may also be faxed to the **official fax number (571) 273-8300**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

**Thomas Pham**  
*Patent Examiner*

A handwritten signature in black ink, appearing to read 'Th Pham', with a long horizontal flourish extending to the right.

December 12, 2005